What is claimed is:

1. A scalable motion image compression system for a digital motion image signal wherein the digital motion image signal has an associated transmission rate, the system comprising:

a decomposition module for receiving the digital motion image signal at the transmission rate, decomposing the digital motion image signal into component parts and sending the components at the transmission rate; and

a compression module for receiving each of the component parts from the decomposition module, compressing the component part, and sending the compressed component part to a memory location.

2. A scalable motion image compression system according to claim 1, wherein the decomposition module includes one or more decomposition units.

3. A scalable motion image compression system according to claim 1, wherein the digital motion image signal is compressed at the transmission rate.

4. A scalable motion image compression system according to claim 1 further comprising a programmable module for routing the decomposed digital motion image signal between the decomposition module and the compression module.

5. A scalable motion image compression system according to claim 4, wherein the programmable module is a field programmable gate array.

6. A scalable motion image compression system according to claim 5, wherein the field programmable gate array is reprogrammable.

7. A scalable motion image compression system according to claim 1, wherein the compression module includes one or more compression units.

8. A scalable motion image compression system according to claim 7, wherein the throughput of a compression unit multiplied by the number of compression units is greater than or equal to the transmission rate of the digital motion image signal.

9. A scalable motion image compression system according to claim 7, wherein each compression unit operates in parallel.

10. A scalable motion image compression system according to claim 1, wherein the decomposition module includes one or more decomposition units.

11. A scalable motion image compression system according to claim 1, wherein each decomposition unit operates in parallel.

12. A scalable motion image compression system according to claim 1, wherein the decomposition module performs color decorrelation.

13. A scalable motion image compression system according to claim 1, wherein the decomposition module performs color rotation.

14. A scalable motion image compression system according to claim 1, wherein the decomposition module performs temporal decomposition.

15. A scalable motion image compression system according to claim 1, wherein the decomposition module performs spatial decomposition.

16. A scalable motion image compression system according to claim 1, wherein the compression module uses subband coding.

17. A scalable motion image compression system according to claim 13, wherein the subband coding uses wavelets.

18. A scalable motion image compression system according to claim 1, wherein the spatial decomposition is spatial polyphase decomposition.

19. A scalable system for performing motion image compression of a digital motion image input signal having an associated transmission rate, the system comprising:

a plurality of compression blocks, each block having a decomposition module and a compression module

a signal distributor coupled to the compression blocks for partitioning the digital motion image input signal into a plurality of segments providing a distinct component of the input signal to each of the compression units;

the decomposition module decomposing a segment into component parts and sending the components; and

a compression module for receiving a component from a corresponding decomposition module, compressing the component, and sending the compressed component part to a memory location.